

Top Group MC Needs/Plans

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Production

- Toronto Production
 - Signal samples
 - W/Z samples
 - Btagging sample
 - **13 M events**
- CAF production
 - Large dilepton bgs (Z- \rightarrow tau tau, WW)
 - W+nP samples
 - Varying mass samples
 - Btagging sample
 - **23.9M events**

Herwig E-conservation

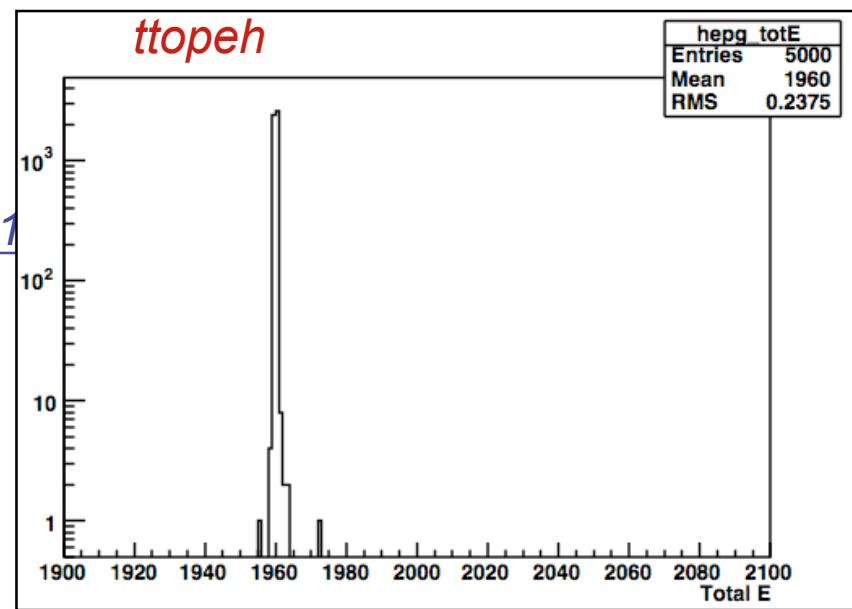
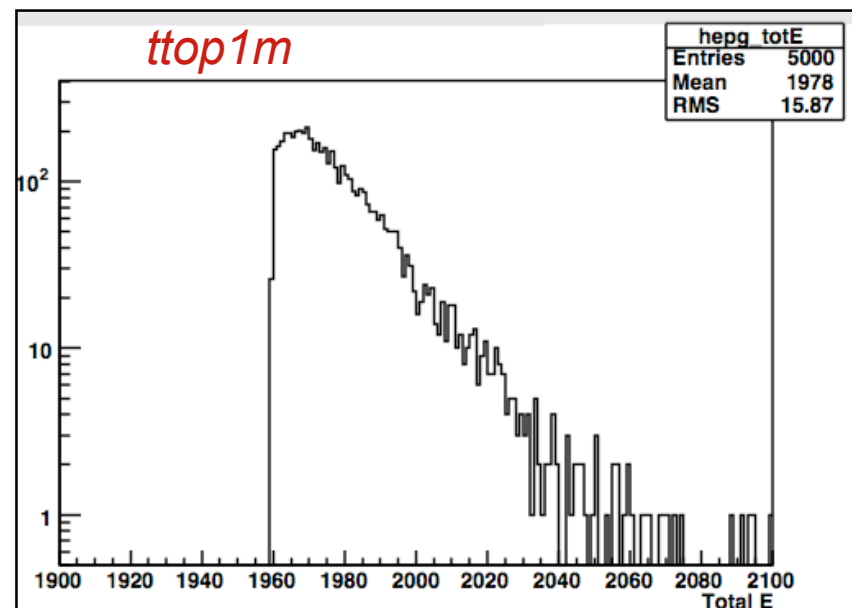
Herwig was compiled with gcc2.96

-Same issue as before

-Same consequences

-Affected: signal & mass samples

-Spared: Alpgen+Herwig samples



New versions of herwig compiled with gcc3.3.1

-6.504

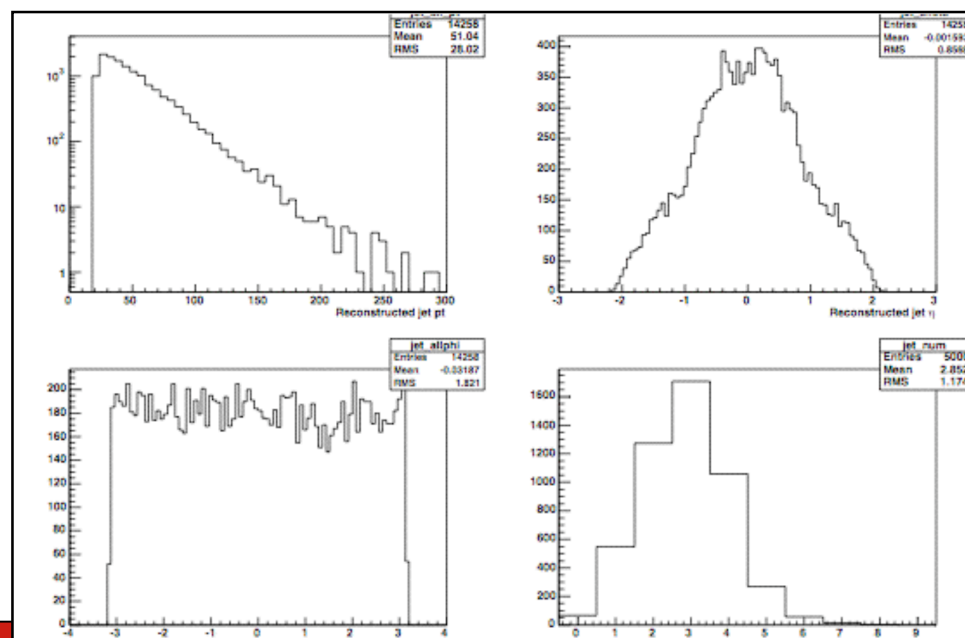
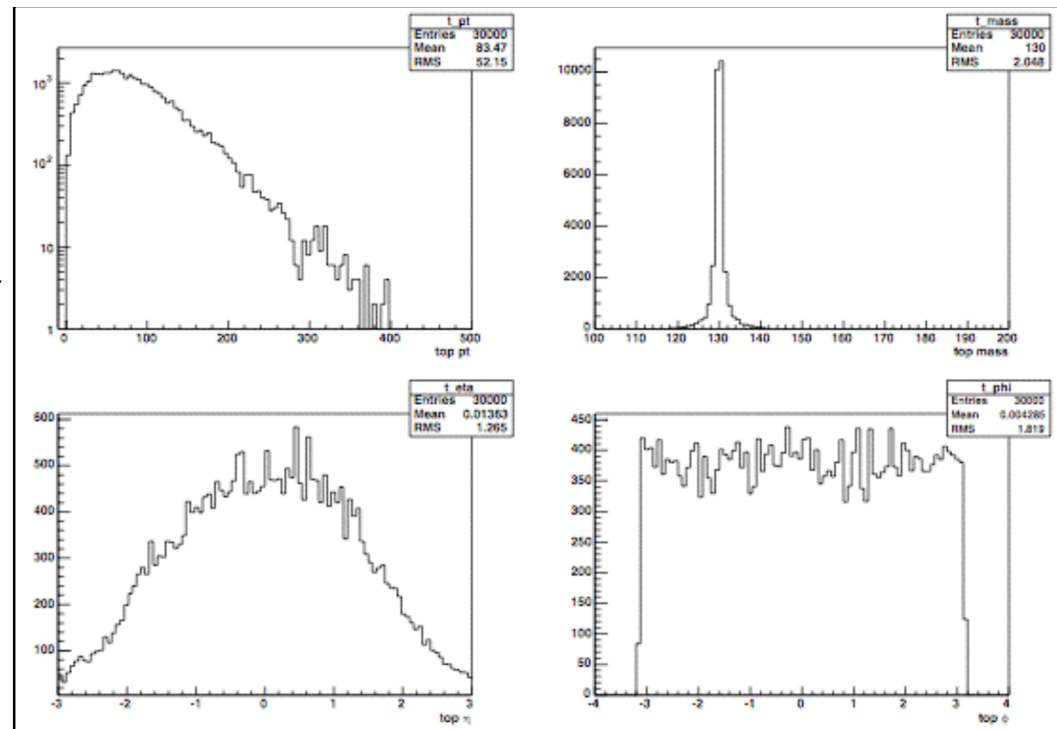
-6.505

Validation Plots

<http://www-cdf.fnal.gov/~danielw/topmc5/>

Validation Reference

TopFind vers: old
 hepg: [[all](#) | [b](#) | [mu](#) | [t](#) | [e](#) | [W](#)]
 reco: [[j](#) | [mu](#) | [e](#)]



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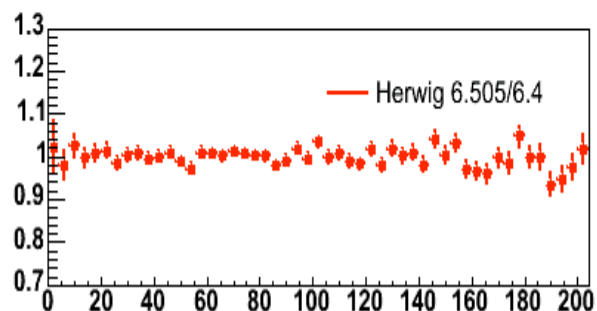
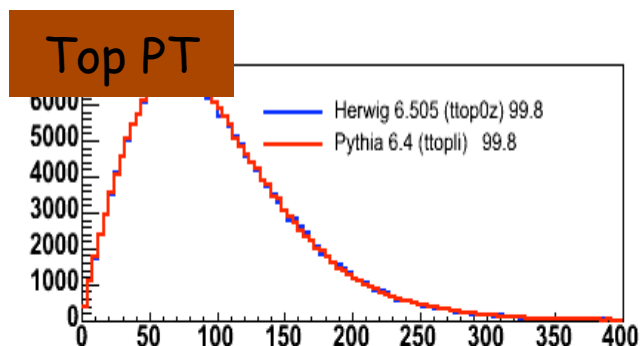
Validation plan

- Pythia
 - Generated mt=175 Pythia ttop0z
- Herwig
 - Generated mt=175 6.504 ttopeh
 - Generated mt=175 6.505 ttop1z
 - Compare with mt=175 6.4 [gen4]
- Basic checks
 - Hepg & Reco-level plots
- Analysis level-checks
 - Acceptance,
 - Mass bias and sensitivities
- Reproduction en masse

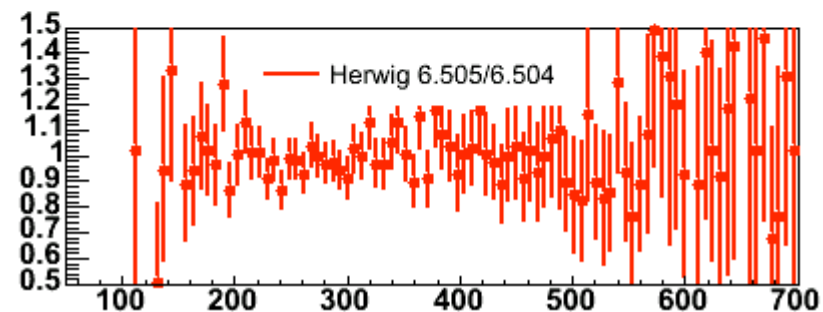
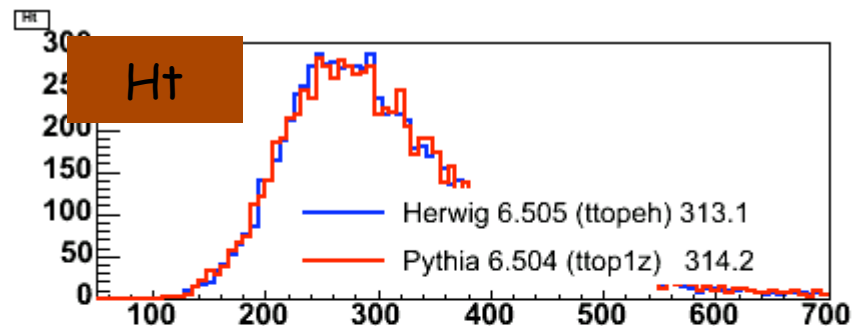
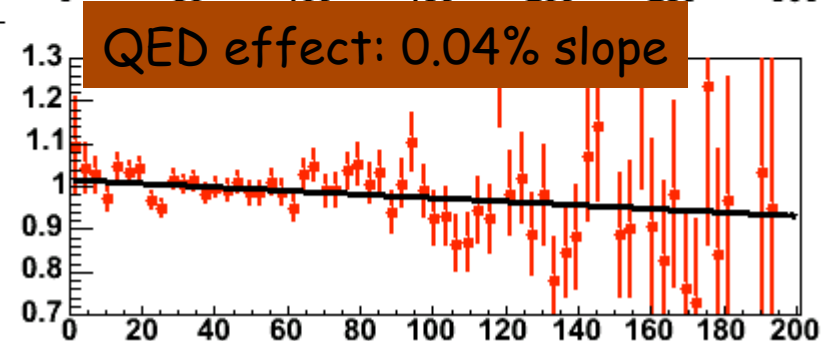
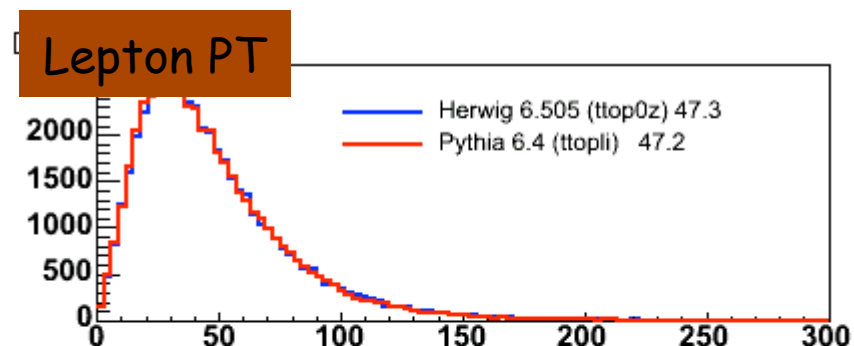
Validation



First validation results (Un-ki)

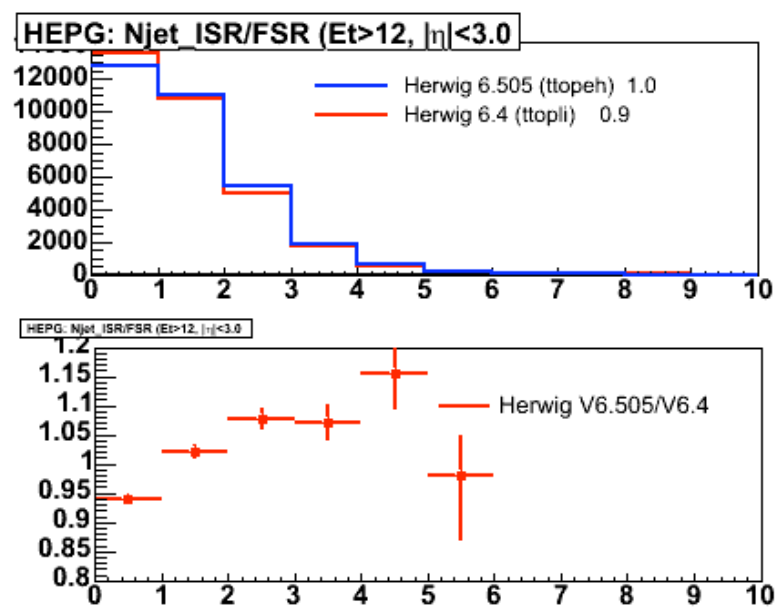


Everything looks good ... so far!



Herwig validation [Un-ki]

HEPG Jets: Njets(from ISR/FSR)



Plans & Needs

- Plans: Many more samples to be stripped & resimulated
 - $Z+nP$
 - $W \rightarrow \tau$
 - All-hadronic
- Needs:
 - Disk space for MC generation